UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE
United States Patent and Trademark Office
Address: COMMISSIONER FOR PATENTS
P.O. Box 1450
Alexandria, Virginia 22313-1450
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/797,266	03/10/2004	Yu Deng	200314604-1	5355

22879   7590   12/28/2006
HEWLETT PACKARD COMPANY
P O BOX 272400, 3404 E. HARMONY ROAD
INTELLECTUAL PROPERTY ADMINISTRATION
FORT COLLINS, CO 80527-2400

EXAMINER
PONIKIEWSKI,.TOMASZ

ART UNIT	PAPER NUMBER
2165	

SHORTENED STATUTORY PERIOD OF RESPONSE	MAIL DATE	DELIVERY MODE
3 MONTHS	12/28/2006	PAPER

Please find below and/or attached an Office communication concerning this application or proceeding.

If NO period for reply is specified above, the maximum statutory period will apply and will expire 6 MONTHS from the mailing date of this communication.

	Application No.	Applicant(s)
Office Action Summary	10/797,266	DENG ET AL.
	Examiner	Art Unit	
	Tomasz Ponikiewski	2165	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE <u>3</u> MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.
- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

1)☒ Responsive to communication(s) filed on <u>06 November 2006</u>.

2a)☐ This action is **FINAL**.   2b)☒ This action is non-final.

3)☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

4)☒ Claim(s) <u>11-20</u> is/are pending in the application.

    4a) Of the above claim(s) <u>1-10, 21-25</u> is/are withdrawn from consideration.

5)☐ Claim(s) _____ is/are allowed.

6)☒ Claim(s) <u>11-20</u> is/are rejected.

7)☐ Claim(s) _____ is/are objected to.

8)☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

9)☐ The specification is objected to by the Examiner.

10)☐ The drawing(s) filed on _____ is/are: a)☐ accepted or b)☐ objected to by the Examiner.

    Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).

    Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).

11)☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

12)☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).

    a)☐ All b)☐ Some * c)☐ None of:

      1.☐ Certified copies of the priority documents have been received.

      2.☐ Certified copies of the priority documents have been received in Application No. _____.

      3.☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

    * See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

1)☒ Notice of References Cited (PTO-892)

2)☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)

3)☒ Information Disclosure Statement(s) (PTO/SB/08)
    Paper No(s)/Mail Date <u>3/10/2004</u>.

4)☐ Interview Summary (PTO-413)
    Paper No(s)/Mail Date. _____ .

5)☐ Notice of Informal Patent Application

6)☐ Other: _____.

DETAILED ACTION

1.   Claims 11-20 are pending. Claims 1-10 and 21-25 are withdrawn from

consideration.

Election/Restrictions

2.   Claims 1-10 and 21-25 are withdrawn from further consideration pursuant to 37

CFR 1.142(b) as being drawn to a nonelected group I, there being no allowable generic

or linking claim. Election was made **without** traverse in the reply filed on 14 August

2006.

Claim Objections

3.   Claim 16 objected to because of the following informalities:

Claim 16 recites the word "for" in line 2. It indicates intended use and as such

does not carry patentable weight. The word could be changed to recite "to". The

limitations following the phrase "for" describes only intended use but not necessarily

required functionality of the claim. Limitations following the phrase "for" do not carry

patentable weight, which cause the claims to appear as a series of non-functional

descriptive material/data without any functional relation with each other. Applicant is

required to amend the claims so that the claim limitations are recited in a definite form.

For example, claim 1 recites "for suggesting" should be "to suggest".

Claim Rejections - 35 USC § 101

4.   35 U.S.C. 101 reads as follows:

> Whoever invents or discovers any new and useful process, machine, manufacture, or composition of matter, or any new and useful improvement thereof, may obtain a patent therefor, subject to the conditions and requirements of this title.

5.   Claims 11-18 are rejected under 35 U.S.C. 101 because the claimed invention is directed to non-statutory subject matter.

Claim 11 lacks the hardware to make the invention statutory. As presented the claims describe software only implementation. To overcome this problem, some hardware (ex. processor or storage) should be added to the claims.

Claim 18 list a condition "when executed by a processor". The condition leave an option of when it is not executed on a processor, the limitations would not be accomplished. The examiner suggests to amend the claim to say "… a program executable on a processor:".

Claim Rejections - 35 USC § 112

6.   The following is a quotation of the second paragraph of 35 U.S.C. 112:

> The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

7.   Claims 2 and 19 are rejected under 35 U.S.C. 112, second paragraph, as being

indefinite for failing to particularly point out and distinctly claim the subject matter which

applicant regards as the invention.

Claim 2 and 19 recites the limitation "the dependant relationships" in lines 2 and

3 respectively. There is insufficient antecedent basis for this limitation in the claim.

Claim Rejections - 35 USC § 102

8.   The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that

form the basis for the rejections under this section made in this Office action:

> A person shall be entitled to a patent unless –
>
> (e) the invention was described in (1) an application for patent, published under section 122(b), by
> another filed in the United States before the invention by the applicant for patent or (2) a patent
> granted on an application for patent by another filed in the United States before the invention by the
> applicant for patent, except that an international application filed under the treaty defined in section
> 351(a) shall have the effects for purposes of this subsection of an application filed in the United States
> only if the international application designated the United States and was published under Article 21(2)
> of such treaty in the English language.

9.   Claims 11-12, 15 and 17-19 are rejected under 35 U.S.C. 102(e) as being

anticipated by Kirkwood et al. (US 7, 139, 973 B1).

As per claims 11 and 18 <u>Kirkwood et al.</u> is directed to a method and a computer

readable medium, comprising:

generating a node to represent a functional relationship between one or more

objects of distinct ontologies in a metadata system (Kirkwood, column 11, lines 66-67;

column 12, lines 1-7);

associating an expression of the functional relationship to the node; and

associating one or more parameters of the functional relationship to the node (column

17, lines 16-23).

As per claims 12 and 19 <u>Kirkwood et al.</u> is directed to further comprising

associating a dependency chain representing the dependent relationships between

properties of a parameter path associated with the one or more parameters of the

functional relationship (column 36, lines 45-48).

As per claim 15 <u>Kirkwoodet et al.</u> is directed to identifying mappings between

dependency chains spanning the distinct ontologies (column 36, lines 45-48).

As per claim 17 <u>Kirkwood et al.</u> is directed to maintaining the mappings that span

the distinct ontologies when one of the distinct ontologies is modified (column 12, lines

36-49.

Claim Rejections - 35 USC § 103

10.   The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all

obviousness rejections set forth in this Office action:

> (a) A patent may not be obtained though the invention is not identically disclosed or described as set
> forth in section 102 of this title, if the differences between the subject matter sought to be patented and
> the prior art are such that the subject matter as a whole would have been obvious at the time the
> invention was made to a person having ordinary skill in the art to which said subject matter pertains.
> Patentability shall not be negatived by the manner in which the invention was made.

11.   Claims 13-14, and 20 are rejected under 35 U.S.C. 103(a) as being unpatentable

over Kirkwood et al. (US 7, 139, 973 B1) in view of Pourheidari (US 2004/0243613 A1).

As per claim 13 Kirkwood et al. does not teach associating one or more

parameters comprises generating a resource that aggregates a local name, type, and

dependency chain.

Pourheidari teaches associating one or more parameters comprises generating a

resource that aggregates a local name, type, and dependency chain (Pourheidari,

paragraph 0079, lines 5-12).

It would have been obvious to one in of ordinary skill in the art at the time the

invention was made to modify Kirkwood et al. by teachings of Pourheidari to include

associating one or more parameters comprises generating a resource that aggregates a

local name, type, and dependency chain because more efficient to store numerous data

under one reference.

As per claim 14 Kirkwood et al. does not teach associating one or more

parameters comprises generating a resource that aggregates a type and a dependency

chain and that is associated to a name through an explicit mapping.

Pourheidari teaches associating one or more parameters comprises generating a

resource that aggregates a type and a dependency chain and that is associated to a

name through an explicit mapping (Pourheidari, paragraph 0079, lines 5-12).

It would have been obvious to one in of ordinary skill in the art at the time the invention was made to modify Kirkwood et al. by teachings of Pourheidari to include associating one or more parameters comprises generating a resource that aggregates a type and a dependency chain and that is associated to a name through an explicit mapping because more efficient to store numerous data under one reference.

As per claim 20 Kirkwood et al. does not teach the program further causes the processor to connect one or more parameters comprising generating a blank node that aggregates a local name, type, and dependency chain.

Pourheidari teaches the program further causes the processor to connect one or more parameters comprising generating a blank node that aggregates a local name, type, and dependency chain. (Pourheidari, paragraph 0079, lines 5-12).

It would have been obvious to one in of ordinary skill in the art at the time the invention was made to modify Kirkwood et al. by teachings of Pourheidari to include the program further causes the processor to connect one or more parameters comprising generating a blank node that aggregates a local name, type, and dependency chain because more efficient to store numerous data under one reference.

Claim Rejections - 35 USC § 103

12.   The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

> (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the

invention was made to a person having ordinary skill in the art to which said subject matter pertains.
Patentability shall not be negatived by the manner in which the invention was made.

13.   Claim 16 rejected under 35 U.S.C. 103(a) as being unpatentable over Kirkwood

et al. (US 7, 139, 973 B1) in view of Govindugari et al. (US 2004/0083199 A1).

As per claim 16 Kirkwood et al. does not teach the identifying further comprises

utilizing heuristics for suggestions of alternative mappings between dependency chains.

Govindugari et al. teaches the identifying further comprises utilizing heuristics for

suggestions of alternative mappings between dependency chains (Govindugari et al.,

paragraph 0200, lines 1-3; paragraph 0201).

It would have been obvious to one in of ordinary skill in the art at the time the

invention was made to modify Kirkwood et al. by teachings of Govindugari et al. to

include the identifying further comprises utilizing heuristics for suggestions of alternative

mappings between dependency chains because heuristics is a well known method in

the art to determine similarities.

Conclusion

14.   The prior art made of record and not relied upon is considered pertinent to

applicant's disclosure.

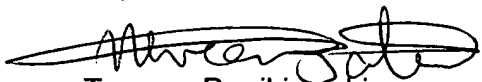Stoffel et al. (US 6,289,338 B1) teaches using probabilistic ontology.

15.   Any inquiry concerning this communication or earlier communications from the

examiner should be directed to Tomasz Ponikiewski whose telephone number is

(571)272-1721. The examiner can normally be reached on 8:00-4:30.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's

supervisor, Jeffrey A. Gaffin can be reached on (571)272-4146. The fax phone number

for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the

Patent Application Information Retrieval (PAIR) system. Status information for

published applications may be obtained from either Private PAIR or Public PAIR.

Status information for unpublished applications is available through Private PAIR only.

For more information about the PAIR system, see http://pair-direct.uspto.gov. Should

you have questions on access to the Private PAIR system, contact the Electronic

Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a

USPTO Customer Service Representative or access to the automated information

system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

Tomasz Ponikiewski
December 21, 2006